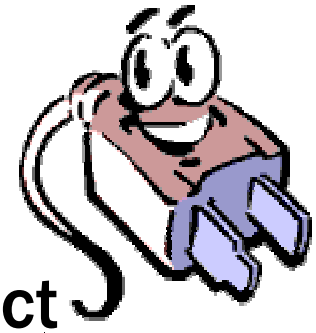
Developmental Disabilities Council



Connect Correct
Internet Accessibility & Usability Guide

Washington State Developmental Disabilities Council
September 2004

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Foreword

"The power of the Web is in its universality. Access by everyone regardless of disability is an essential aspect."

-- Tim Berners-Lee, World Wide Web Consortium (W3C) Director and inventor of the World Wide Web

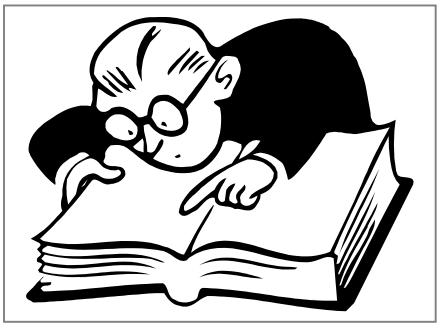
Since it's inception in 1994, the Internet has virtually transformed the way we live our lives and permanently impacted the world in which we live. From rudimentary beginnings, the face of the Internet has changed. Evolving technology has enabled us to listen to the radio, watch videos and perform tasks in our home or office that would have been unheard of a decade ago.

As computer technology's influence expanded, the United States government recognized the potential divide that could occur when technology was developed that was inaccessible to persons with disabilities. To address this concern, Congress amended the Rehabilitation Act in 1998 to require federal agencies to make their electronic and information technology accessible to people with disabilities. This section of the amended act, called Section 508, applies to all federal agencies when they develop, procure maintain, or use electronic and information technology.

In a more international context, W3C has also developed guidelines for developers to use when creating technology. Their (constantly evolving) guidelines ensure that web site and other software applications are designed to be inclusive of all users.

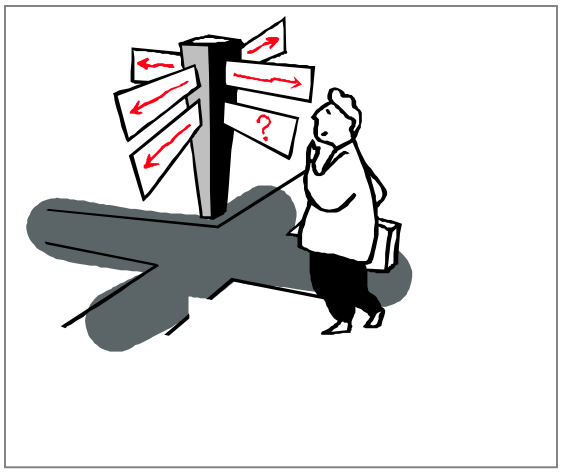
This guide has been created to serve as a tool for web site developers of varying abilities. We hope you are inspired to begin or continue your efforts toward accessibility for all.

Using this guide



This guide was designed to help web page designers make their web pages more accessible for people with disabilities as well as more usable for all users accessing their site. A hidden benefit in designing for accessibility for persons with disabilities is that it almost always improves the site's accessibility all users.

As with any publication, the audience for this guide probably consists of individuals with a wide spectrum of knowledge and abilities. Because of this, users may want to use this guide in differing ways.



Guide Organization

Beginning web designers will have an easier time with the guide if they review the glossary before reading the Accessible Web Sites section of this guide. Newer designers will benefit from reading all the questions. Designers more familiar with accessibility and usability issues can simply browse for issues or topics that are most pertinent to them. Users interested in using this guide as an avenue to other resources can look for the info symbol. →

Bookmarks

If you are using a computer to use this guide, you will occasionally see words or terms underlined. Clicking on these bookmarks it will take you to a definition of the underlined word or term. Feel free to use or ignore these items when using the guide.

Accessibility and the World Wide Web

What is web accessibility?

A web site is accessible when any potential user, using any browsing technology, and disregarding ability and expertise, is able to get a full comprehension of all the information and fully interact with the site.

Why is Internet accessibility a big issue?

Organizations that receive federal funding are required to meet the terms of the Americans with Disabilities Act (ADA). At this time, other agencies are not. However, it is important to remember that people with disabilities are the only group you can discriminate against on the web. You cannot bar access to online content based on race, religion, sex or national origin. Only individuals with disabilities can be denied access to information. With thoughtful planning your organization can have a web site that is accessible for users with disabilities and as a result is more accessible for all users who visit your web site.

How many people have some type of disability?

According to the 2000 U.S. Census, nearly 20% of the U.S. population reported a disability of some type. While not all types of disabilities affect users' ability to use a web site, the potential of losing some site visitors because of accessibility issues is a real concern.

What does it mean when a web site is accessible?

When a web site is accessible, it means that users with disabilities are able to access the site and complete the same functions as users without a disability. They may not complete the functions in the same manner as a user without a disability, but they must be able to complete the same tasks.

Accessibility is often related to how users with assistive technology experience a web site. Programming that aids in the visual aesthetics of a web site can often create problems for persons using assistive technology, especially readers. Some examples of items that can be a problem on web pages are:

- Graphics
- Multimedia files
- Tables
- Frames
- Repetitive navigation links

Is accessibility limited to how I build my web site and pages?

No. Design choices made by web site creators can have impact for people with disabilities in two ways. An **information barrier** exists if Web content is incomprehensive or difficult to read. Information barriers are partly addressed in web accessibility, but are more closely related to web usability. A **technology barrier** exists if the user is not able to access a web site either because of unfamiliarity with computer operation or because of the design of the web site.

Accessibility focuses on the technology barrier users may experience. Usability and accessibility can both contribute to any information barriers users may encounter on a web site.

Why do I need to worry about my organization's web pages?

Organizations of all types post web pages that describe information about the services or products they provide. Often, when smaller businesses or non-profits decide to create a web site they look to non-technical staff to create or maintain their web information. Web page development programs are now available that require no experience with programming language. Being able to create a web site without the need to hire or contract out for web design services increases the ability of small organizations to connect with their customers on the World Wide Web. However, when non-technical staff create web sites, accessibility may become an issue with the finished product because of their limited understanding of the programming language that has worked 'behind the scenes' to create their web site.

Web Accessibility and Usability

What is the difference between accessibility and usability?

Accessibility and usability are often confusing as to definition and meaning. This is partially because although each is independent from the other, usability and accessibility are complimentary.

Accessibility focuses on how barrier free the technology is. Accessibility problems are those that make it more difficult for persons with disabilities to use an application or service than for persons without a disability. An accessible web site is accessible to anyone, regardless of disability.

Usability focuses on how intuitive and easy it is for all people to use. A usable web site is one that is easy and efficient to use, easy to remember and protects users from making mistakes. Site visitors find that usable web sites provide a pleasant experience.

As cited above, accessibility and usability are closely related, as they both improve satisfaction, effectiveness and efficiency for users. However, it's possible for a site to be accessible and not usable and vice versa – a site could be usable but not accessible.

Creating Accessible Web sites

Where do I start?

Once you've committed to having an accessible web site, your next steps will depend on whether your organization already has a web site or is wanting to create one.

1. **Initial Design or Redesign of Web Sites**

   Retro-fitting Established web sites
   If your organization already has a web site, you will want to review and test it with an accessibility tool, and based on the results, make repairs to your site.

   Creating New Sites
   If you are creating a new web site, you will want to ensure that your web site launches as an accessible site. You will also want to read the section on web site usability before you begin your site development. Tips for using some of the front-end web site developing software, such as FrontPage and Dreamweaver follow.

2. **Look at Your Links –Ensure Posted Web Documents are Accessible**
   Once you've retro-fitted or created your web site you also need to look at your links. To be truly accessible, you need to ensure that the items you link to are accessible also.

3. **Test and Test Again**
   If you've retro-fitted your established web site, you'll have already tested your web site with an accessibility tool. When you've made your changes, you'll want to do it again to ensure that you've eliminated the errors detailed in your report. If you've created a new web site you'll want to test it before launching. Keeping in mind the limitations of accessibility tools, you will also want to get test users to visit your site. Your test users can be users with disabilities or not. These users will be focusing on the information aspect of accessibility. This also overlaps with the usability aspect of web design. You'll want to be sure users are able to easily navigate and understand how to complete activities on your web site.

4. **Redesign with the End in Mind**
   Once your web site is launched, you will probably make changes and add enhancements. You will want to consider how the proposed changes will impact the accessibility and usability of your site. If you assess the possible impact before proceeding with changes, you will avoid costly mistakes and ensure continual accessibility for your web site visitors.

5. **Access Additional Resources**
   This guide has listings of additional resources for accessibility and usability as well as links to other site that can help you as you work. These sites can offer you additional information, but they are just one of the many ways you can learn more about accessibility. Local community colleges or libraries may offer usability classes; local Internet technology professionals may be willing to share their expertise. If all else fails, you can go to a web search engine, type in "web accessibility" or "web usability" and see what's been posted on the Web.

Getting Started

What is an accessibility tool and where can I get one?

Whether you are retro-fitting or creating a new site, you will need to use an accessibility tool. An accessibility tool scans the source code (the coding that creates the web page) of a Web page using interpretations of either the United States Rehabilitation Act Section 508 standards and/or the World Wide Web Consortiums Web Contact Accessibility Guidelines. The accessibility tool then generates a report which details the potential accessibility problems that users may encounter when using your site.

There are numerous free accessibility tools available on the Internet. A list of some of these tools is below:

Free, Online Accessibility Tools

- Bobby Online Service (Watchfire) http://bobby.watchfire.com/bobby/html/en/index.jsp
- Cynthia Says (HiSoftware) http://www.cynthiasays.com/fulloptions.asp
- Step508. Tool developed collaboratively with the Department of Health and Human Services. It is available on the Section 508 web site at: http://www.section508.gov/index.cfm?fuseaction=content&id=155
- Wave 3.5 (WebAIM) http://www.wave.Webaim.org/wave35/index.jsp

Can I use a HTML validator to test my site's accessibility?

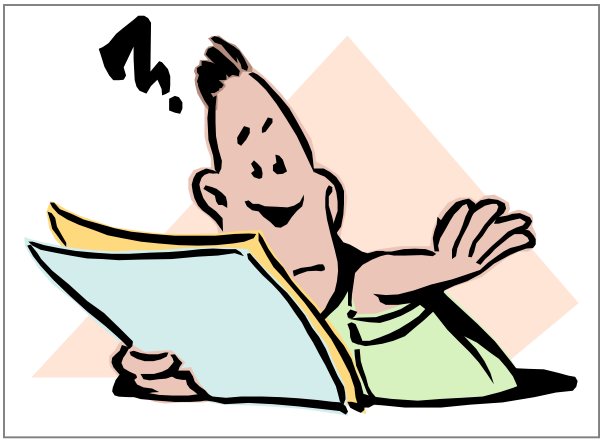
In a word, no.

HTML validators check the mark-up language of a Web page against its document-type definition. This definition is listed before the <html> tag in the source code and defines the type of HTML being used and the mark-up tags being employed within the age. HTML validators will simply tell the users whether their code is valid or not.

Accessibility tools scan the source code of a web page interpretation from either the US Rehabilitation Act Section 508 standards of the W3 Consortiums Web Content Accessibility guidelines.

My accessibility report is five miles long! Why?

This is the downside of some accessibility tools. Web accessibility tools are an automated process. Because the tools are automated they will bring up results that aren't necessarily correct in the context of your page. Just like Microsoft Word tries to "help you" with spelling, these tools just do what they're programmed to do. These accessibility tools are really helpful, but you will get the most out of them by learning and understanding the Web accessibility standards.



Web accessibility standard resources are listed later in this section.

Retro-fitting Established Web sites

How do I fix an existing web site?

If your organization already has a web site there are steps you can take to make your organization's current web site accessible, a five step process is outlined briefly below:

1. **Evaluate your current site to determine what areas of your site need work.** This includes running an accessibility tool (the WAVE, Bobby, etc.) on your site's pages. You will also want to navigate your site using only a keyboard, not your mouse.

2. **Fix the easiest issues on the home page first.** This would include missing alt text for graphics, inadequate or incorrect text, and links to other pages that don't convey their purpose.

3. **Fix your page templates, since that will fix a large portion of your accessibility problems.** Work to make the navigation scheme as consistent and intuitive as possible and use the simplest layout structure that you can.

4. **Fix all HTML-related issues in the content pages.** This includes data tables, forms, and your documents' structure.

5. **Fix all non-HTML issues in the content pages.** This would include providing captioning for videos that are on your site, removing or reformatting your Flash content and ensuring that your PDF files are in tagged format or you are providing HTML version in addition to the PDF file.

Alt-Tex(t)
The first guy to call when making graphics accessible to visually impaired web site visitors

Following the steps above should help you improve your site's accessibility for all your users.

Developing New Web sites

If you are developing a new web site you may be excited to "just get it on the web". While you may just end up with an accessible site, you would be well-advised to spend some time thinking about your site's usability. More information on usability is in this guide's "Usability as an Accessibility Issue" section. This portion of the web site deals specifically with web site design software and accessibility.

How can I use FrontPage and still ensure that my web site is accessible?

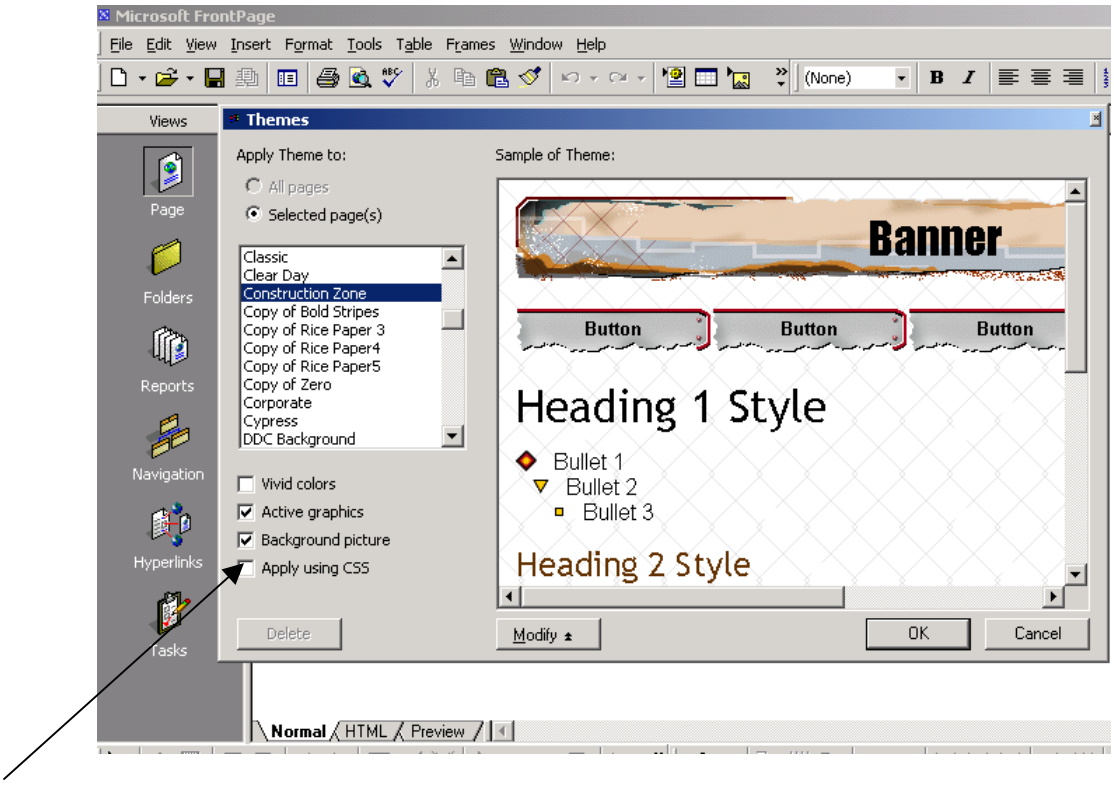
If you've been given Front Page and the instructions to make a web site, don't panic! If you have FrontPage 2000, you can create accessible web content with a little patience and a little assistance in learning HTML coding. www.webaim.org has a great tutorial that will help you ensure that you are adequately labeling information on your web page so that those users who are using readers can easily access your web site. The tutorial is located at: http://www.webaim.org/techniques/frontpage

Should I Use the Cascading Style Sheet Function in Front Page?

The WebAIM article mentioned above doesn't specifically address cascading style sheets. Cascading style sheets can make your web site much easier to use and maintain. If at all possible, you should use this Front Page function. When you do, you are separating the formatting information (which tells the browser how to show your page to the user) from the content. This makes it easier for users that have screen readers to use and navigate your web site.

Cascading Style Sheets Help Users Using Screen Readers

Cascading style sheets are a component of Microsoft Front Page, but you need to know how to access them. When you go format your theme, there is a box in the first screen that opens:



By selecting "Apply using CSS" you are telling FrontPage that you want to create your site or page using Cascading Style Sheets.

How do I design an accessible site using Dreamweaver?

Dreamweaver, a Macromedia program, is another front-end design program. Web Aim has recently released a tutorial on Accessibility Features of Dreamweaver MX and Dreamweaver 2004 that will be helpful as you design your web site using the Dreamweaver software.

What if I'm creating a web site using HTML?

If you already have knowledge about HTML then you are ahead of the game. When you create a web site you will have a better understanding of the concepts you will be using to create your design and a better understanding of reports generated from accessibility tools.

Your HTML web site will still be more accessible if you use style sheets. It will be easier for your users with disabilities to use. Links to tutorials on creating cascading style sheets:
http://www.w3schools.com/css/default.asp
http://webmonkey.wired.com/webmonkey/reference/stylesheet_guide/
http://www.d.umn.edu/itss/support/Training/Online/webdesign/css.html

Look at Your Links –Ensure Web Documents are Accessible

Once you've made the content of your website accessible, you will want to ensure that the documents you post on it are accessible also. This section contains information about increasing the accessibility of Microsoft Word, Microsoft PowerPoint and Adobe Acrobat documents.

How do I make Microsoft Word documents more accessible?

Often times you will be linking users to a Microsoft Word document. One of the best ways you can increase documents readability for those with vision impairment is to use the style sheet function in Word to format your document. You may also be surprised to know that by using some of the same functions to create a word document you can also create a web page with increased functional capacity.

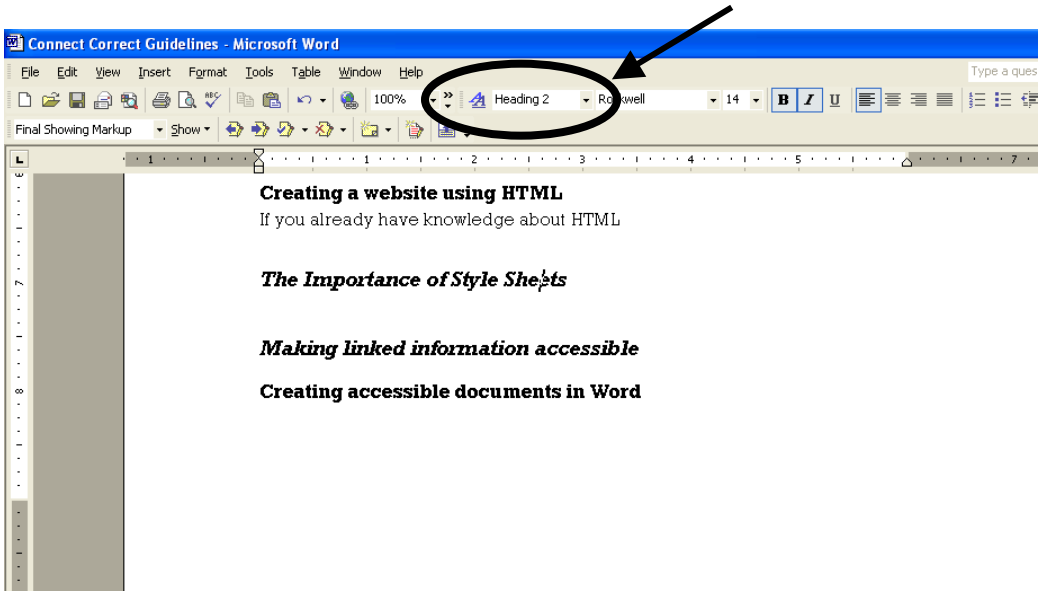
What is a style sheet?

In word processing and desktop publishing, a style sheet is a file or form that defines the layout of a document. When you fill in a style sheet, you specify such parameters as the page size, margins, and fonts. Style sheets are useful because you can use the same style sheet for many documents and they increase the ability of readers to understand the structure of a document or web page.

Why does it matter how I format Word documents?

When trying to make a larger heading in Word, most people just go to their font size button to create larger size font or to make something bold. While to the visual eye there may be no difference between "font style: Rockwell, Size 14 font, Bold, Italic" and the use of the style sheet Heading 2 below, the difference to a user using a screen reader will be dramatic. Screen readers will not be able to understand the structure of your document when you change size manually. So, using a Style Sheet to create your document is beneficial whether you are going to simply post your word document on a web site, or are going to turn it into a web page. Using Style Sheets can benefit you in other ways also, including: ability to change the look of your entire document or documents quickly, ease in creating tables of contents, and quick exporting into HTML.

Style Sheets Provide Structure and Streamline Changes to Documents



To learn how to use styles, search for Styles in Microsoft Word help in the version you are using.

Why else should I use a style sheet?

If you have not used style sheets before, you will be surprised at the ways it can simplify some of your work. Style sheets are especially useful if you work with lengthy documents. The other benefits include: the ability to change the look of your entire document or documents quickly, ease in creating tables of contents, and quick exporting into HTML.

What if I want to save my Word document as a web page?

Once you have learned to use Microsoft Word Styles and have incorporated them into your Word document, you will be able to easily export your document into a web page. The only additional steps you will need to take is to provide alternative text for all the document images. You do this by right clicking on the image, selecting "format picture" and then moving to the "Web" tab. Once you see the alternative text box, type in text that describes your graphic and hit, "OK". After all graphics have alt-text, you will export the file to the web using the "save as Web page" option from the "File" menu.
Web AIM has a tutorial which provides more detail on this process at:
http://www.webaim.org/techniques/word/

How do I ensure my posted PowerPoint presentations are accessible?

PowerPoints can pose a problem to screen readers. So, to ensure that your Power Point is accessible to all users who access your site, you will need to post a version of your presentation in HTML format. WebAIM has a tutorial for formatting PowerPoint which includes a link to an add on created by the University of Illinois that converts PowerPoint slides into an accessible HMTL format.
The tutorial is available at: http://www.webaim.org/techniques/powerpoint/

How do I ensure my posted PDF files are accessible?

Until recently, PDF files were not accessible with screen readers. The newer versions of Adobe (5.0 and 6.0) have their own reader, so accessibility has increased. However, even with the new enhancements, there are issues you must consider when trying to determine whether you should have PDF documents on your web site. Again, webaim has an excellent article on Adobe Acrobat Accessibility Techniques which should prove useful as you decide if and how you want include PDF documents in your web site. The article is available at:
http://www.webaim.org/techniques/acrobat/

Adobe also has information about creating accessible PDF documents on their web site at: http://www.adobe.com/products/acrobat/access_booklet.html

Accessibility Resources

General Information

AARP's OlderWiserWired is dedicated to issues of access and use for older Americans. This information is helpful for both web users and designers.

Web Accessibility Standards

Web Accessibility Initiative is part of the World Wide Web Consortium's Web site. Web Accessibility Initiative is the group that is responsible for the Web Content Accessibility Guidelines. For HTML-savvy users, this is the first resource you will want to use and keep as an on-going reference.

Section 508 Web Accessibility Checklist for HTML lists the Section 508 standards and criteria for passing and failing in each requirement section.

Accessibility Tools and Wizards

www.webaim.org is a web site exclusively devoted to increasing information about accessibility to the web for persons with disabilities. It also offers tutorials and articles for web designers to use to increase the accessibility of their web sites. This is a great resource for web designers and those who want to know more about accessibility issues. Visiting their Site Index is a quick way to get an idea of the large number of topic areas this site covers.

Accessify.com has a Tools and Wizards Page which can quickly get you to the accessible help you need for many of the commonly used programs. The page was last updated in November 2003, so be aware that some of the information is dated. Their homepage, however, is up-to-date and has articles detailing some of the latest in web accessibility news.

Auxiliary Benefits of Accessible Web Design is the Web Accessibility Initiative's work to present a business case for the implementation of Web accessibility. This is definitely an article for more experienced users.

The Art of Alt is an article that concentrates on one small but important part of your page: the alt-text. Learning to write descriptive alt-text is one of the best ways to make your site more helpful to visitors who can't see your web pages. This article is brief and informative.

Disability Simulations

Vischeck is a site where you can run your web pages to see how they will look to users with different types of color blindness. Although Vischeck doesn't work on all web sites, it is still worth the investigating to see what you may be able to learn about your site.

WebAIM Simulations provide users a chance to experience using web sites with some of the technologies users with disabilities may use. In addition, there is a chance to see what the experience of visitors with cognitive disabilities may be like to a web site. Worth the trip!

Style Sheets

Creating Accessible Cascading Style Sheets is a tutorial created by Webaim which describes the benefits of cascading style sheets and helps web designers learn how to use them.

www.csszengarden.com is a web site that shows the endless possibilities of cascading style sheets. Using the same html file, web designers develop cascading style sheets that radically change the look of the page. Studying the wide array of designs that have been created is an inspiration to learn and master cascading style sheets.

Testing & Usability - Increasing Accessibility for All

Usability as an Accessibility Issue

As touched on briefly previously, focusing on accessibility won't necessarily ensure that your users can easily navigate and perform tasks on your site. Paying attention

to the usability of your site increases the accessibility of your site for all your users. When measuring whether a website is usable, the questions to consider about the website are:

- Is the website easy to learn?
- Can users quickly perform desired tasks?
- Can users remember navigation and tasks learned on previous visits to the site?
- Is the site forgiving of user errors?
- Is visiting the web site a pleasant experience?

Usability Tools and Web Site Design

Understand What Users Want When They Visit Your Web site

Because of the Web's popularity, researchers have spent a lot of time trying to understand what gets people to and staying at a web site.
Just like large companies, you will want to be aware of the factors that will increase the usability of your site. The table below illustrates common web site user likes and dislikes.

Understanding What Users Like When They Visit Your Web site

USERS LIKE:	USERS DON'T LIKE:
Ease of use/navigation	Slow loading web sites
Fast download time	Help buttons that can't help
Regularly updated information	Irrelevant search results
Quality content	Poorly organized content
Organized content	No search facility
Search tool	Scrolling down/through lots of pages to get to needed information
	Advertisements & pop up boxes
	Cluttered design
	Broken links

Usability & Understanding the Purpose of Your Web site

Understanding the purpose of your web site is the key piece of information you need when beginning the planning for your web site. For agencies that already have a web site, this question (hopefully) has already been answered. If you are creating a new web site, you will want to know the answers to the questions below to help increase the usability (and thus accessibility) of your web site before you even begin creating your pages:

- **Why is a visitor coming to my web site?** Design your web site with your user in mind. If your organization provides services for different types of customers, then you will need to organize a home page that will help people identify what part of the web site will give them the information they need.

- **When visitors come to my web site, what is their immediate need?** Some customers come to your site just wanting a quick way to find your phone number and contact information. Make sure that visitors can either get contact information off your home page or have a quick link to get this information.

- **How will visitors be able to travel through my web site to get to the exact information they need?** Nothing's more frustrating then getting trapped in a web page that goes nowhere. Sometimes visitors will locate a page through a search engine or by an e-mail from a friend. Make sure that users are able to navigate easily from any page they visit on your web site. If you have pages without navigational tools your visitors will be unable to access the rest of your site.

Improving Your Web Site's Usability

- **Put only information relevant to your end user on your home page.** Site visitors want to know right away if they have arrived "at the right place".

- **Provide an explanation of what your site is about on your home page**. Or, if that is not provide a link called "about us" for further clarification.

- **Provide site wide links**. This allows easy navigation and reduces time users spend browsing pages to get to the right place.

- **Use clear and consistent navigation and maintain a simple consistent layout throughout your site.** Visitors will avoid a site when they are unable to find what they need there.

- **Provide a site map and a search tool.** Not only does this make your site more accessible, it increases the user's ability to find information quickly and efficiently. Site maps provide a skeleton of the entire site on a single webpage with all links, enabling the user to determine quickly where they need to go on your site.

- **Update regularly.** If your web site doesn't stay current, you lose credibility and users won't come back.

- **Keep scrolling short.** Only 10% of visitors scroll down beyond the information that is below the initial screen area that appears on a web page. See definition of "Above the Fold" for more details on this item.

- **Use icons (and corresponding alt tags) to help users navigate.** Providing icons to users helps them quickly visually or by matching alt tags to navigate the right place to go on your web site.

- **Choose a simple web address.** This makes it easier for visitors to remember you when they want to come back to your site.

- **Create fast-loading web pages.** Web users don't like pages that take a long time to load. If your page doesn't load quickly (in 8 seconds or less), it is likely your visitors will press their back button and look for another site. Some reasons why a page may have a long loading time include: use of large graphics, use of too many tables, providing too much information on one page, or use of an inferior web hosting services which results in slow data transfer.

- **Ensure that your web site has readability.** It doesn't matter how beautiful your web page looks, if your readers can't read and understand the text on your web page. Make sure there is enough contrast between text and the page background. Use fonts that are easily viewed on the Web. You can make your web site more readable by:
    - Selecting a font that is the right size. You will want to use a size 10 or 12 point for your text.
    - Using proper fonts and limiting the number used on your page. Verdana and Arial are good font types to use for web pages.
    - Using short sentences.
    - Shortening the number of paragraphs. Use bullets to chunk information into smaller, easier-to-read bits.
    - Avoiding busy backgrounds and be sure there is high contrast between the background and the text.

Usability Resources

More Information

Useit.Com is the web site of one of the foremost names in usability, Jakob Neilsen. His weekly columns may be of interest to those who wish to delve deeper into usability topics.

http://usability.gov/ is the US Department of Health and Human Services free resource for designing usable, useful and accessible web site. The web site provides links to guidelines and usability topics. Some of the listed links are old, but if you

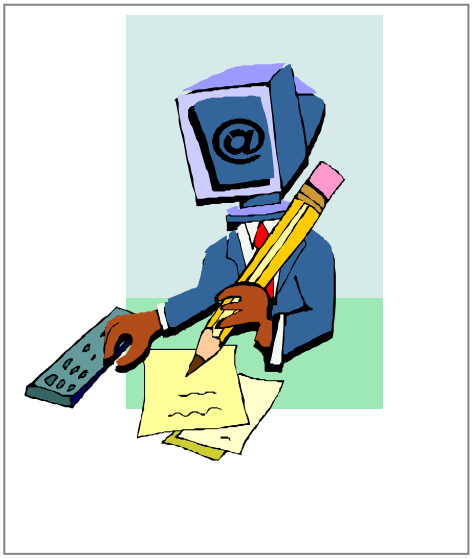
link to the web sites, there will often be new information.

Free Downloadable Guides

Research-Based Design and Usability Guidelines is a highly-detailed (128 page) guide developed jointly by the Department of Health and Human Services, the National Cancer Institute and the National Institute of Health to aid web designers, managers and researchers in developing web sites. Originally developed for cancer research presentation, the guidelines were compiled by experts in the field of web design and usability. Guidelines are rated by strength of evidence and importance, further increasing its value to serious web designers and those who wish to know more about web usability.

Web Usability Intro is a design handbook developed by an Australian Company, Information and Design. The 36-page guide can be helpful to groups who are working together to design or improve a web site. It has exercises to help participants understand user-centered design and usability practices.

Testing, Testing - 1, 2, 3



1. *Test before you go live*

   Testing your site before you launch helps you determine changes that need to be made before you "go live". You will want to test to see:
   - If your site loads in all browsers
   - The hyperlinks work
   - Spelling and grammar is correct.
   - Web pages will load quickly.

2. *Test with accessibility tools*

   As described earlier, an accessibility tool scans the source code (the coding that creates the web page) of a Web page using interpretations of either the United States Rehabilitation Act Section 508 standards and/or the World Wide Web Consortiums Web Contact Accessibility Guidelines. By testing your web site and making needed changes you will be taking the largest step toward making your web site technically accessible.

3. *Test with warm bodies*

   Testing is a lot less complicated than you may think. Your testers don't have to be computer people. In fact, they shouldn't be. You will want to select at least five people who would be similar to the visitors who will be coming to your web site to serve as testers. Once you have your testers, you will want to show them either the web site or the web plan/site map and ask them:

   - What is the purpose of this web site?
   - If you arrived at this home page, where would you go first? And, where after that?
   - Does this web site provide what you need? What you expected?

   If you pick testers unfamiliar with your organization's purpose, you have an added advantage. These testers will be able to tell you if your web site provides enough information about your organization to enable potential users or customers to accurately gauge if they have arrived at the right place.

   Using testers can be one of the most beneficial ways to ensure your site and its structure will work for your site's visitors.

Re-Design with the End of Mind

Once you've created or re-designed your web site it's easy to move accessibility and usability to a back burner. As discussed earlier, keeping web pages current keeps visitors coming to your site. Keeping your web page current should mean it is current for everyone. When you are ready to make changes to your site, you will want to answer these questions:

- Does my proposed change positively impact the ability of users to use my site?
- If my proposed change is not accessible to all my users, is it really necessary? If it is necessary, am I providing the same information in an alternative format?
- Will adding this to or changing this on my web site increase or decrease the ongoing maintenance of my site?

In the end, it is wise to remember that accessibility and usability will need to be constantly revisited, as the Internet and its' supporting technologies continue to develop.

Glossary

Above the Fold
Above the fold is a journalism term that has been incorporated into the vocabulary of the web. Newspapers are designed so that the elements that will capture a reader's (or potential buyer's) attention is above the fold on the front page of the newspaper. This is the part that will be displayed at newsstands, so important "eye-catching" information is "above the fold". Web sites also need to ensure that the important information is displayed in the first screen a user encounters on their web site.

Accessibility tools
Accessibility tools scan the source code of a Web page using interpretations of either the United States Rehabilitation Act Section 508 standards and/or the World Wide Web Consortiums Web Contact Accessibility Guidelines.

ALT-attribute (Alt-text)
Part of the image source tag in HTML. You will want to include alt- text in all of your image sources for two reasons: (1) if any of your visitors choose not to view graphic images on your web pages, the alternative text will be shown; and (2) if your visitors use Internet Explorer as their browser and they leave the mouse over any graphic image, they will view the text in your ALT-attribute.

Browser
The software used to view, manage, and access web pages by interpreting hypertext and hyperlinks. The two most common browsers are Netscape and Microsoft Internet Explorer. Web pages often appear differently depending on the brand and version of the browser intended to view them in.

Cascading Style Sheets
Cascading Style Sheets are a feature of HTML developed by the W3C. With Cascading Style sheets, both web designers and end users can create style templates (sheet) that specifies how different text elements (paragraphs, headings, hyperlinks, etc.) appear on a web page. Cascading style sheets can be useful in keeping the amount of coding information on a web page to a minimum. This can help users who are accessing a site using a reader.

Data Table
A table that is used to present data in a tabular or spreadsheet format. This contrasts with a layout table that uses the same construct for a different purpose.

Domain Name
The unique name that identifies an Internet site. On the Web, the domain name is part of the Uniform Resource Locator (URL) that tells a domain name server where to forward a request for a Web page.

Flash
Vector graphic animation software from Macromedia that allows Flash graphics to look the same across all browsers, as long as the plug-in is installed. One of the advantages of Flash animations is their relatively fast download time. Flash graphics are generally not accessible elements of a web page for users with disabilities. If you do want Flash in your web site, Web Aim has a tutorial on creating accessible Flash at: http://www.webaim.org/techniques/flash/

Font
A font is a complete set of characters in a particular size and style of type. This includes the letter set, the number set, and all of the special character and diacritical marks you get by pressing the shift, option, or command/control keys. For example, Times New Roman Bold Italic is one font, and Times New Roman Bold is another font. Times New Roman is a single typeface. To ensure your web page text is readable, choose a san-serif font, such as Verdana or Arial.

Forms
HTML tags that define and label text-entry boxes, check boxes, radio buttons, and/or drop-down menus to create simple on-screen forms for collecting information from the viewer.

Frames
In HTML, providing the ability to break a web page into multiple, separately scrollable areas. Because some search engines cannot follow links in a framed web site, a good web designer will contain text in a NOFRAMES-tag and provide a link for search engines to index your site. When designing accessible web site, don't use frames unless you have to. If you use them provide frame titles that communicate their purpose.

Home Page
The main page of a website. The home page generally serves as a gateway to the rest of the web site by providing links to the other pages.

HTML
Abbreviation for Hypertext Markup Language; a cross-platform text-formatting system for creating web pages, including copy, images, sounds, frames, animation and more.

HTML Validators
HTML validators are Standard Generalized Markup Language (SGML) Parsers that check the mark-up language of a Web page against its document-type definition (DTD). DTD defines the type of HTML being used and the mark-up tags that can be employed within the page. HTML validators can tell users whether their code is valid or invalid.

Hyperlink
A hyperlink, more commonly called a link, is an electronic connection between one web page to either (1) other web pages on the same web site, or (2) web pages located on another web site. More specifically, a hyperlink is a connection between one page of a hypertext document to another.

Hypertext
Hypertext is any text that can be chosen by a reader and which causes another document to be retrieved and displayed.

Icon
A small picture on a Web page that represents the topic or information category of another Web Page. Frequently, the icon is a hypertext link to that page.

Image Map
An image map is a single graphic image containing multiple, clickable hyperlinks. When using an image map on accessible pages, you will need to label both the components of the image map (using alt tags) and the larger single image in which they are contained.

JavaScript
JavaScript is a scripting language developed by Netscape. JavaScript can make web pages more animated and dynamic in terms of graphics and navigation. One of the most common graphic JavaScript effects is called a mouseover, and Javascript navigation is commonly created using drop-down menus.

Meta-tag
Meta-tags are HTML tags that can be used to identify the creator of a web page, what HTML specifications a web page follows, the keywords and description of the page, etc. The most common use of a meta-tag in online marketing is the keyword and

description tags, which tell the search engines that index meta-tags what description to use in their search query results.

Mouseover
A popular special effect for web graphics, generally programmed in JavaScript, that changes switches color or a graphic image when you place your cursor over it. Mouseovers can also be used to trigger navigation changes and pop-up windows. Because many users with disabilities do not use a mouse, it is better not to add this functionality to your web site.

Navigation
Process/system which facilitates movement from one Web page to another Web page. Navigation is often taken for granted, but it plays a crucial role in getting site visitors to view more than just the home page. If navigation choices are unclear, visitors may elect to hit the "Back" button on their first (and final) visit to a Web site.

Page Template
A pre-designed but generic Web page used to create new custom pages.

PDF
Stands for Portable Document Format. Created by Adobe Systems in its software program Adobe Acrobat as a universal browser. Files can be downloaded via the web and viewed page by page, provided the user is computer has installed the necessary plug-in which can be downloaded from Adobe's own web site.

Query
A search request submitted to a database (such as the search engine and directory databases) to find a particular piece of information or all records that meet the search criteria. A search query box to the search engine Google generally looks like the following:

Search Engine (Tool)
A search engines is a program that searches documents (i.e. web pages, which are HTML-documents) for specified keywords and returns the list of documents. A search engine has two parts, a spider and an indexer. The spider is the program that fetches the documents, and the indexer reads the documents and creates an index based on the words or ideas contained in each document.

Section 508
The Section of the Rehabilitation Act that requires any electronic information developed, procured, maintained, or used by the federal government be accessible to people with disabilities. As a result of new requirements added to the Rehabilitation Act in 1998, guidelines for electronic information—including Web

sites—have been developed and were adopted in December 21, 2000. All electronic information created or acquired by any federal agency or department on or after June 21, 2001 must comply with these accessibility standards.

Site Map
A visual model of a Web site's content that allows the users to navigate through the site to find the information they are looking for. Typically site maps are organized hierarchically, breaking down the web site's information into increasingly specific subject areas.

Style sheet
In word processing and desktop publishing, a style sheet is a file or form that defines the layout of a document. When you fill in a style sheet, you specify such parameters as the page size, margins, and fonts. Style sheets are useful because you can use the same style sheet for many documents. For example, you could define one style sheet for personal letters, another for official letters, and a third for reports. Style sheets are also called templates. On the World Wide Web a style sheet refers to cascading style sheets.

Thumbnail
A small version of a graphic image. For example, the image below is a thumbnail image of a web page.

URL
URL is the abbreviation for Uniform Resource Locator and is an address referring to a document on the Internet. In other words, it is the address of an individual web page element or web document on the Internet. The syntax of a URL consists of three elements:
the protocol, or the communication language, that the URL uses;
the domain name, or the exclusive name that identifies a web site; and
the path name of the file to be retrieved, usually an HTML document.
Most newbies mistakenly believe a URL is the same as a domain name or home page. Every web document and web graphic image on a web site has a URL.
For example, the URL for a home page is commonly written as:
http://www.companyname.com/index.html
The http:// is the protocol.
The www.companyname.com is the domain name.
The index.html is the path name.

W3C
W3C stands for the World Wide Web Consortium. W3C is an international group that both develops and promotes standard technologies for the web. Their Web Accessibility Initiative promotes making the Internet accessible for all. They have created the World Wide Web Accessibility Guidelines. The guidelines and assistance with accessibility issues are available at: http://www.w3.org/WAI/

Web Site
A web site is a collection of electronic pages generally formatted in HTML (Hypertext Markup Language) that can contain text, graphic images, and multimedia effects such as sound files, video and/or animation files, and other programming elements such as Java and JavaScript.

WYSIWYG
Abbreviation for What You See Is What You Get. Refers to web editors, like FrontPage, which assist users to create web pages without knowledge of programming languages.

XHTML
Abbreviation for Extensible Hypertext Mark-up Language and is a hybrid of XML and HTML. Web pages designed in XHTML should look the same across all platforms.

XML
Abbreviation for Extensible Mark-up Language, a flexible text format that was originally designed to meet the challenges of large-scale electronic publishing.

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